



SEQUENCE LISTING

<110> Ervik, Jonathan W.

<120> Methods and Products for Peptide-Based DNA
Sequence Identification and Analysis

<130> 2087 010262

<140> US 09/788,268

<141> 2001-02-16

<150> PCT/US99/30104

<151> 1999-12-16

<150> US 60/182,816

<151> 2000-02-16

<150> US 60/189,310

<151> 2000-03-14

<160> 28

<170> Microsoft Word 97 SR-2

<210> 1

<211> 6

<212> PRT

<213> Artificial Sequence

<220>

<223> Example of sequence made up entirely of six-codon amino acids

<400> 1

Leu Arg Arg Leu Leu Arg

1

5

<210> 2

<211> 6

<212> PRT

<213> Artificial Sequence

<220>

<223> Example of sequence made up entirely of one-codon amino acids

<400> 2

Met Trp Trp Met Met Trp

1

5

<210> 3

<211> 100

<212> DNA

<213> Homo sapiens

<400> 3

gaattctttac acctcatact ttccaagcc ccaactttct catctgaaaa tggtaatagt 60

atcaticctta catgtttaag gtcacgaatt gctatgtgta

100

<210> 4

<211> 16

COPY

<212> PRT
<213> Homo sapiens

<400> 4
Thr Met Ile Thr Pro Ser Leu His Ala Cys Arg Ser Thr Leu Glu Asp
1 5 10 15

<210> 5
<211> 100
<212> DNA
<213> Homo sapiens

<400> 5
gaattcacat aaatcgcaaa tttttttttc cttoccagag ccattcaaaa ctctgtttgt 60
caaaggcctg tctgaggata ccactgaaga gacattaaag 100

<210> 6
<211> 99
<212> DNA
<213> Homo sapiens

<400> 6
gaattctctt gggttttgtg gtgtgctaga ctttaattacc catgaatgat tttgtcctct 60
tgagaaaatt tcaatagcac atctattagt gttttttat 99

<210> 7
<211> 27
<212> DNA
<213> Artificial Sequence

<220>
<221> SITE
<222> (4)..(9)
<223> Oligonucleotide primer containing EcoRI site

<400> 7
cccgaattca gcaggtaaaa atcaagg 27

<210> 8
<211> 29
<212> DNA
<213> Artificial Sequence

<220>
<221> SITE
<222> (4)..(9)
<223> Oligonucleotide primer containing EcoRI site

<400> 8
ggggaattct tactcttctc cactgctat 29

<210> 9
<211> 24
<212> DNA
<213> Artificial Sequence

<220>
<223> Nucleotide input sequence used to deonstrate computer program capabilities

<400> 9
caactagaag aggtaagaaa ctat

24

<210> 10
<211> 8
<212> PRT
<213> Artificial Sequence

<220>
<223> Computer program output of encoded peptides

<400> 10
Gln Leu Glu Glu Val Arg Asn Tyr

<210> 11
<211> 326
<212> DNA
<213> Homo sapiens

<220>
<221> exon
<222> (37).. (283)

<400> 11
gggaagccca tctccagctg tctgtttccc tttaagtcga atcaagagca acgtggatgg 60
gcggtacctg gtggacggcg tccctttcag ctgctgcaat cctagctcgc cacggccctg 120
catccagtat cagatcacca acaactcagc aactacagt tacgaccacc agacggagga 180
gctcaacctg tgggtgcgtg gctgcagggc tgccttgcgt agctactaca gcagcctcat 240
gaactccatg ggtgtcgtca cgctcctcat ttggctcttc gaggtaggcc ctgggcagct 300
gggggtagag ggtaaggaga gcctcc 326

<210> 12
<211> 36
<212> DNA
<213> Artificial sequence

<220>
<223> Primer synthesized and used to PCR amplify rds/peripherin exon 2
from an individual known to carry a wild type allele of
rds/peripherin.

<400> 12
ggcccggaat tctccagctg tctgtttccc tttaag 36

<210> 13
<211> 37
<212> DNA
<213> Artificial sequence

<220>
<223> Primer synthesized and used to PCR amplify rds/peripherin exon 2
from an individual known to carry a wild type allele of
rds/peripherin.

<400> 13
aatctactcg agctaccccc agctgcccag ggcctac 37

<210> 14
<211> 364
<212> PRT

<213> Artificial sequence

<220>

<223> Fusion protein

<400> 14

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Met Ser Pro Ile Leu Gly Tyr Trp Lys Ile Lys Gly Leu Val Gln Pro
 1           5           10           15
Thr Arg Leu Leu Leu Glu Tyr Leu Glu Glu Lys Tyr Glu Glu His Leu
      20           25           30
Tyr Glu Arg Asp Glu Gly Asp Lys Trp Arg Asn Lys Lys Phe Glu Leu
      35           40           45
Gly Leu Glu Phe Pro Asn Leu Pro Tyr Tyr Ile Asp Gly Asp Val Lys
      50           55           60
Leu Thr Gln Ser Met Ala Ile Ile Arg Tyr Ile Ala Asp Lys His Asn
      65           70           75           80
Met Leu Gly Gly Cys Pro Lys Glu Arg Ala Glu Ile Ser Met Leu Glu
      85           90           95
Gly Ala Val Leu Asp Ile Arg Tyr Gly Val Ser Arg Ile Ala Tyr Ser
      100          105          110
Lys Asp Phe Glu Thr Leu Lys Val Asp Phe Leu Ser Lys Leu Pro Glu
      115          120          125
Met Leu Lys Met Phe Glu Asp Arg Leu Cys His Lys Thr Tyr Leu Asn
      130          135          140
Gly Asp His Val Thr His Pro Asp Phe Met Leu Tyr Asp Ala Leu Asp
      145          150          155          160
Val Val Leu Tyr Met Asp Pro Met Cys Leu Asp Ala Phe Pro Lys Leu
      165          170          175
Val Cys Phe Lys Lys Arg Ile Glu Ala Ile Pro Gln Ile Asp Lys Tyr
      180          185          190
Leu Lys Ser Ser Lys Tyr Ile Ala Trp Pro Leu Gln Gly Trp Gln Ala
      195          200          205
Thr Phe Gly Gly Gly Asp His Pro Pro Lys Ser Asp Leu Ile Glu Gly
      210          215          220
Arg Gly Ile Gln Asp Leu Val Pro His Thr Thr Pro His His Thr Thr
      225          230          235          240
Pro His His Thr Thr Pro His His Thr Thr Pro Gln Asp Leu Asn Ser
      245          250          255
Pro Ala Val Cys Phe Pro Leu Ser Arg Ile Lys Ser Asn Val Asp Gly
      260          265          270
Arg Tyr Leu Val Asp Gly Val Pro Phe Ser Cys Cys Asn Pro Ser Ser
      275          280          285
Pro Arg Pro Cys Ile Gln Tyr Gln Ile Thr Asn Asn Ser Ala His Tyr
      290          295          300
Ser Tyr Asp His Gln Thr Glu Glu Leu Asn Leu Trp Val Arg Gly Cys
      305          310          315          320
Arg Ala Ala Leu Leu Ser Tyr Tyr Ser Ser Leu Met Asn Ser Met Gly
      325          330          335
Val Val Thr Leu Leu Ile Trp Leu Phe Glu Val Gly Pro Gly Gln Leu
      340          345          350
Gly Val Ala Arg Ser Ser Gly Arg Ile Val Thr Asp
      355          360
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<210> 15

<211> 87

<212> DNA

<213> Artificial sequence

<220>

<221> misc_feature

<222> (35)..(37)

<223> Upstream primer used to reamplify amplicons
Start codon at 35-37

<400> 15
ggatcctaatac gactcact atagggagac caccatgcat caccatcatc accatcacca 60
ctctccagct gtctgtttcc cttaag 87

<210> 16
<211> 35
<212> DNA
<213> Artificial sequence

<220>
<223> Downstream primer used to reamplify amplicons

<400> 16
cttagtcatt atacccccag ctgcccaggg cctac 35

<210> 17
<211> 21
<212> DNA
<213> Homo sapiens

<400> 17
ttcctcctct ctttatttta g 21

<210> 18
<211> 24
<212> DNA
<213> Homo sapiens

<400> 18
actaaacaat gtacatgaac atac 24

<210> 19
<211> 24
<212> DNA
<213> Homo sapiens

<220>
<221> variation
<222> (1)..(3)

<400> 19
tatttctctcc tctctttatt ttag 24

<210> 20
<211> 24
<212> DNA
<213> Homo sapiens

<400> 20
actaaacaat gtacatgaac atac 24

<210> 21
<211> 27
<212> DNA
<213> Homo sapiens

<220>
<221> variation

<222> (1)..(6)

<400> 21

tattacttcc tcctctcttt atttttag

27

<210> 22

<211> 24

<212> DNA

<213> Homo sapiens

<400> 22

actaaacaat gtacatgaac atac

24

<210> 23

<211> 30

<212> DNA

<213> Homo sapiens

<220>

<221> variation

<222> (1)..(9)

<400> 23

tactatttat tcctcctctc tttatttttag

30

<210> 24

<211> 24

<212> DNA

<213> Homo sapiens

<400> 24

actaaacaat gtacatgaac atac

24

<210> 25

<211> 33

<212> DNA

<213> Homo sapiens

<220>

<221> variation

<222> (1)..(12)

<400> 25

tactatttat acttcctcct ctctttatatt tag

33

<210> 26

<211> 24

<212> DNA

<213> Homo sapiens

<400> 26

actaaacaat gtacatgaac atac

24

<210> 27

<211> 156

<212> DNA

<213> Homo sapiens

<220>

<221> exon

<222> (22)..(132)

<400> 27

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ttcctcctct ctttatttta gctggaccag accaattttg aggaaaggat acagacagcg 60
cctggaattg tcagacatat accaaatccc ttctgttgat tctgctgaca atctatctga 120
aaaattggaa aggtatgttc atgtacattg tttagt 156
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<210> 28

<211> 247

<212> DNA

<213> Homo sapiens

<400> 28

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aacagaactg aaactgactc ggaaggcagc ctatgtgaga tacttcaata gctcagcctt 60
cttcttctca gggttctttg tgggtgtttt atctgtgctt ccctatgcac taatcaaagg 120
aatcatcttc cggaaaatat tcaccaccat ctcatctctgc attgttctgc gcatggcggt 180
cactcggcaa ttccctggg ctgtacaaac atggtatgac tctcttgag caataaacia 240
aatacag 247
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